

IN THE CLAIMS

Claims 1-8 cancelled.

9. (New) A device for the monitoring of flames in a burning chamber of a yellow-flame oil burner and a blue-flame oil burner and controlling a fuel supply thereto, said device comprising:

a flame sensor for detecting illumination intensity in the burning chamber; and

a monitoring circuit for controlling the fuel supply in dependence on the flame sensor detected illumination intensity, said monitoring circuit being configured for providing an error message to interrupt the fuel supply when the illumination intensity in the burning chamber exceeds a luminance threshold ( $B_{\max}(I)$ ) during a starting phase (I) of the oil burner and when the illumination intensity in the burning chamber falls below a darkness threshold ( $B_{\min}(III, IV)$ ) during a stabilization phase (III) and an operating phase (IV) of the oil burner, said darkness threshold ( $B_{\min}(III, IV)$ ) being higher than the luminance threshold ( $B_{\max}(I)$ ) and wherein the darkness threshold ( $B_{\min}(III)$ ) during the stabilization phase (III) is higher than the darkness threshold ( $B_{\min}(IV)$ ) during the operating phase (IV).

10. (New) The flame monitoring device according to claim 9 wherein the darkness threshold ( $B_{\min}(III)$ ) of blue-flame oil burners during the stabilization phase (III) is higher than the illumination intensity during the operation phase (III).

11. (New) The flame monitoring device according to claim 10 wherein said monitoring circuit is configured with a maximum luminance threshold ( $B_{\max}$ ) higher than the darkness threshold ( $B_{\min}(\text{IV})$ ) during the operating phase (IV) above which the monitoring circuit interrupts the fuel supply.

12. (New) The flame monitoring device according to claim 11 wherein said monitoring circuit is configured for providing the luminance threshold ( $B_{\max}$ ) for the stabilization phase (III).

13. (New) The flame monitoring device according to claim 12 wherein said monitoring circuit is configured for providing the maximum luminance threshold ( $B_{\max}$ ) during a receipt phase of the oil burner, said security phase according between the starting phase (I) and stabilization phase (III).

14. (New) The flame monitoring device according to claim 13 wherein said flame sensor comprises a light depending sensor.

15. (New) A method for controlling fuel supply to an oil burner comprising:

interrupting the fuel supply when the illumination intensity in the burning chamber exceeds a luminance threshold ( $B_{\max}(\text{I})$ ) during a starting phase (I) of the oil burner and when the illumination intensity in the burning chamber falls below a darkness threshold ( $B_{\min}(\text{III}, \text{IV})$ ) during a stabilization phase (III) and an operating phase (IV) of the oil burner, said darkness

threshold ( $B_{\min}(\text{III}, \text{IV})$ ) being higher than the luminance threshold ( $B_{\max}(\text{I})$ ) and wherein the darkness threshold ( $B_{\min}(\text{III})$ ) during the stabilizing phase (III) is higher than the darkness threshold ( $B_{\min}(\text{IV})$ ) during the operating phase (IV).

16. (New) The method according to claim 15 wherein at least during the operating phase (IV) the fuel supply is interrupted above a maximum luminance threshold ( $B_{\max}$ ) higher than the darkness threshold ( $B_{\min}(\text{IV})$ ).